

THE GLOBAL TOPOGRAPHY MISSION (TOPSAT)

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An earth orbiting mission concept has been developed to produce a 30m resolution, 2-3m vertical accuracy, global topographic data set using Interferometric Synthetic Aperture Radar. The mission uses two identical spacecraft flying in formation with L-band radars. The radar baseline is measured to 3mm by simultaneous GPS measurements on the two satellites. The radar **covers** a 35km swath, allowing the land area to 70 degrees latitude to be covered in less than 3 months. The area between 70 and 83 degrees would be sampled by a Multi-Beam Laser Altimeter with 0.2m vertical accuracy, 30m resolution and 150m swath.

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- 4. Overhead projector
- 5. Oral presentation
- 6. None

2.Session- G7, New Projects and
Geodetic Activities

3.Dr. Erricos Pavlis